



# Online Publishing as a Support for Scholarly Communication in Dynamic Knowledge Communities

**Ana Alice Baptista  
Eloy Rodrigues  
Altamiro Barbosa Machado**

**Universidade do Minho  
Portugal**



# Goals of an Online Journal

- Promote the rising of **Knowledge Communities** and **interdisciplinarity**
- Promote, develop and maintain the **communication** between elements of a knowledge community
- Narrow the gaps, and integrate as much as possible, **formal and informal** communication





# Knowledge communities and interdisciplinarity

- Large scope
- Large base of documents from several fields or even areas
- Personalization through dynamic profile construction





# Communication

- Up to date contents - publishing as soon as acceptance
- Updated hyperlinks
- No space limitations - publish full study
- Not necessarily periodic
- Submission made easy
- Peer Review Process fast and coherent





## Communication (cont.)

- Several genres of documents (including informal ones)
- Metadata for these document genres
- Multiple versions
- Forward references
- Multilanguage support





## Communication (cont.)

- Individual work support
- Share of individual work
- Group and cooperative work support
- Personalized and standard search
- Shared and group search
- Annotations and Comments
- Statistics utilities

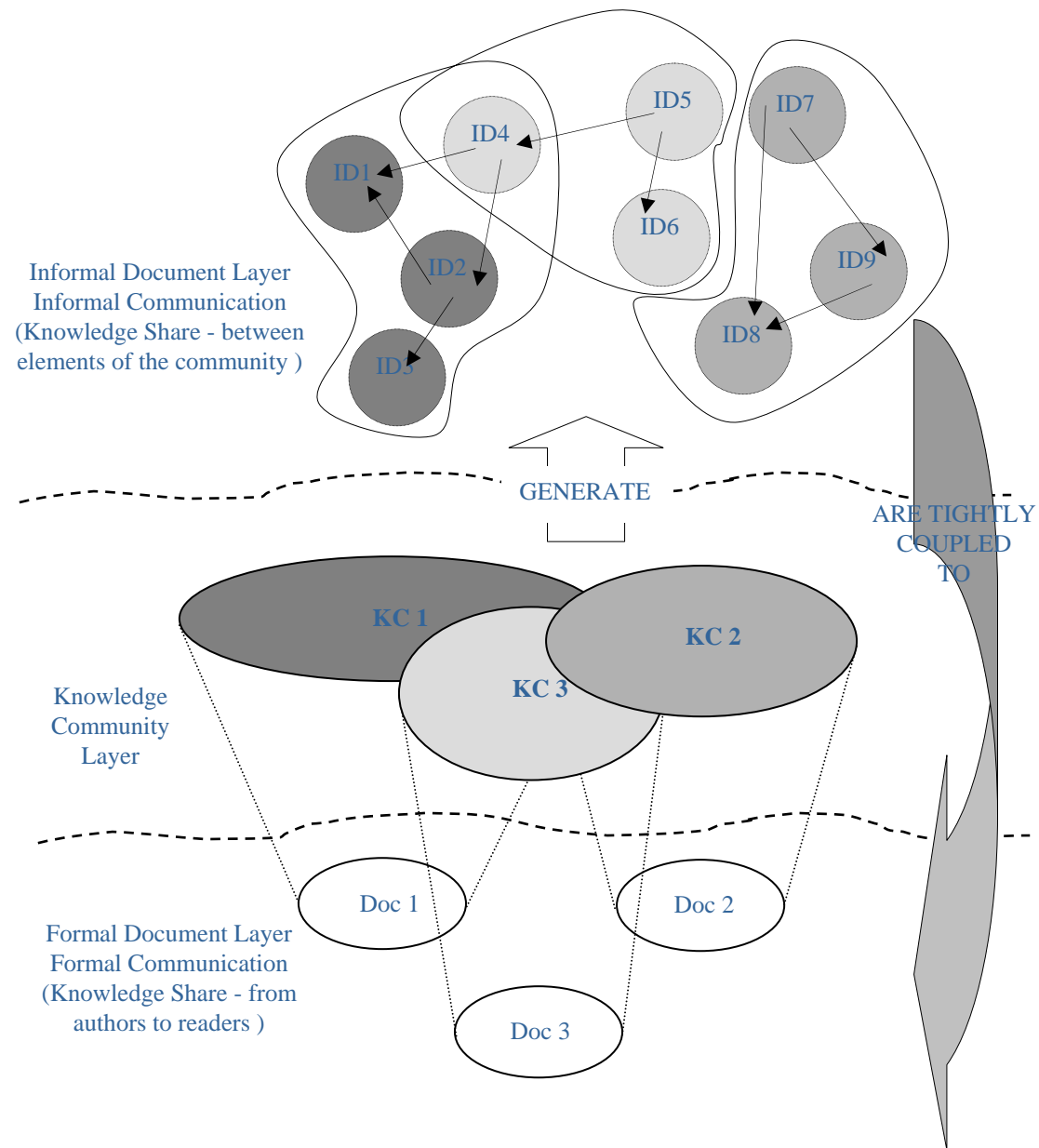




# Formal and Informal Communication

- Formal communication data, metadata and processes
- Informal communication data, metadata and processes
- Relationships between:
  - Formal documents
  - Informal documents
  - Informal and formal documents









# Informattica Online

Submission  
and Peer  
Review

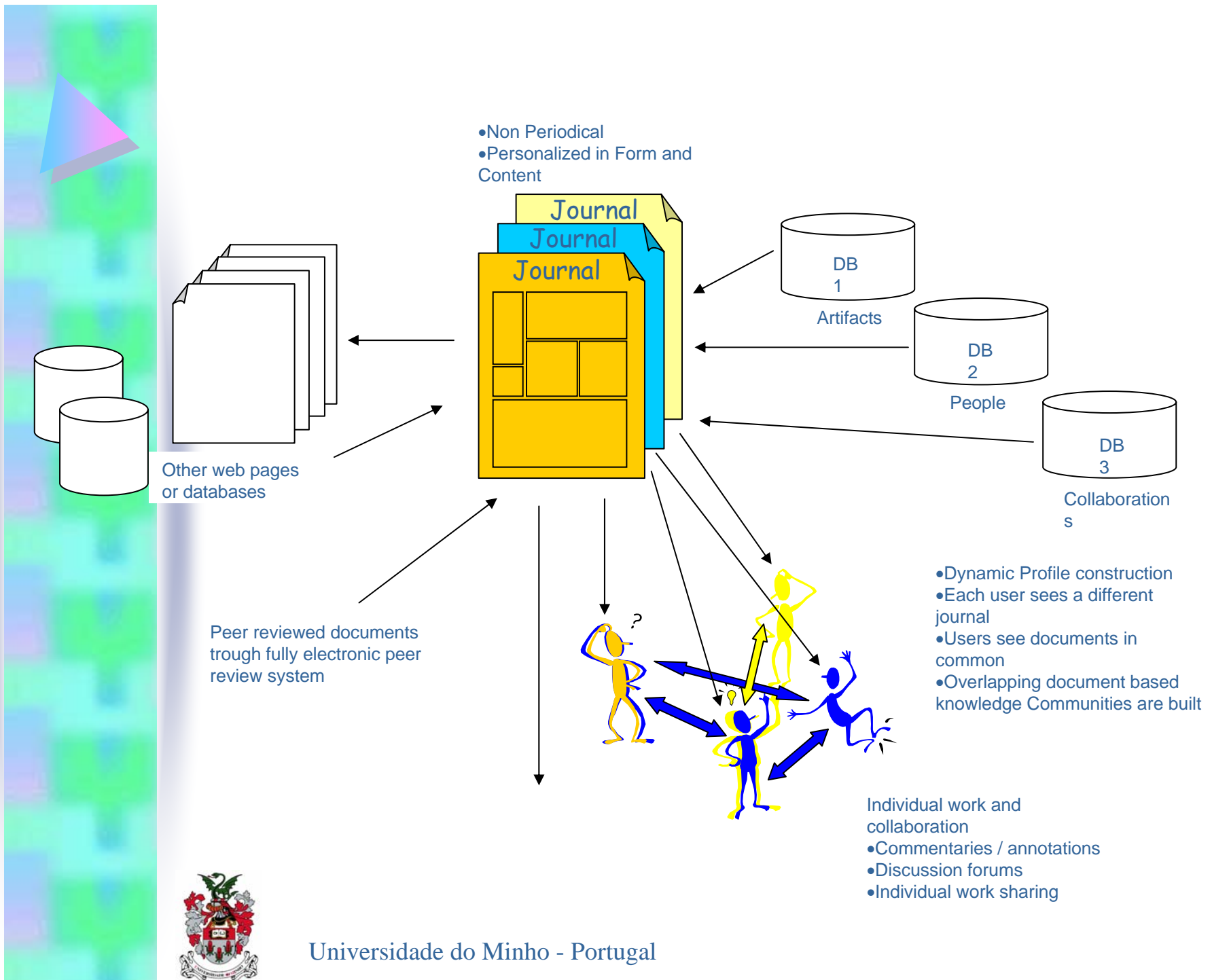
Editing and  
Publishing

Reading and  
Comenting

Collaboration

Research







# User Profile

- Several Kinds of Roles for Users:
  - Author
  - Reader
  - Commenter
  - Reviewer
  - Editor
  - Editor in Chief
  - Publisher
  - Editor Assistant





# User Profile

- Contents of interest
- Form those contents are accessed or retrieved
- Common part of general information
- Specific parts defined accordingly to the roles the user plays





# Future Work

- Already done: System requirements using UML Use Case view
- Next: System analysis and Design processes
- Components that can be used:
  - automatic classification system
  - multilanguage system
  - search engines





## Future Work (cont.)

- Other:
  - Metadata for new document genres
  - Multiple versions handling of dynamic documents
  - Relationships between formal and informal documents
  - Citation issues
  - Dynamic profile construction and personalization





## Future Work (cont)

- Information behaviour of Portuguese Informatics Community **prior** to the use of this system
- Information behaviour **after** the system is implemented





# Conclusion

- Hope: Richer communication between scholars
- Hope: Knowledge share between different fields of knowledge
- Try: To take advantages from technology
- Try: Not to forget what a journal in fact is and might be

